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$$\text{Hence: } t_{\perp} = 2l_o/c \cdot \sqrt{1-\beta^2} \approx 2l_o/c \cdot (1 - \beta^2/2), \quad (1)$$

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$$\text{So, } t_{\parallel} (\text{total}) = t_{\parallel \rightarrow} + t_{\parallel \leftarrow} = (2l_o/c) (1 + \beta^2) \text{ and}$$

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coinciding with Michelson and Morley result /7,8/, although they made more simplified geometric calculations but yet considering (with James Maxwell) "that light waves are propagated in the free ether in any direction and always with the same velocity with

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$$\text{Hence : } t_{\perp} = 2l_0/c \cdot \sqrt{1-\beta^2} \approx 2l_0/c \cdot (1 - \beta^2/2), \quad (1)$$

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$$OM_1' = ct_{\parallel \rightarrow} = P'O + P'M_1' = l_0 + V_e t_{\parallel \rightarrow}, \text{ hence } t_{\parallel \rightarrow} \approx l_0(1 + \beta + \beta^2)/c,$$

$$M_1'O' = ct_{\parallel \leftarrow} = M_1'P' - P'O' = l_0 - V_e t_{\parallel \leftarrow}, \text{ hence } t_{\parallel \leftarrow} \approx l_0(1 - \beta + \beta^2)/c$$

where  $t_{\parallel \rightarrow}$  and  $t_{\parallel \leftarrow}$  are the time for the  $\parallel$  pathway to the right and left (Fig.1A).

$$\text{So, } t_{\parallel} (\text{total}) = t_{\parallel \rightarrow} + t_{\parallel \leftarrow} = (2l_0/c)(1 + \beta^2) \text{ and}$$

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But one can see from Fig.1A, that the time difference between  $\parallel$  and  $\perp$  beam paths depends on the observation point of their meeting, that, however, never was really considered during already the century of the World success and very intensive discussions.

Let us calculate the above time difference at some observation point E (at the distance value  $x$  from O' with order of value of  $OO'$ , it means  $l_o \beta$  /where  $OO' = 2V_e t_{\perp} /$ ).

#### 7.3.2.1. $\perp$ path $OM_2'E$ .

$$OM_2' = \sqrt{(M_2'P'')^2 + (OP'')^2} = \sqrt{l_o^2 + (OP' + P'P'')^2} = \sqrt{l_o^2 + (OP' + x/2)^2}$$

$$OM_2' = l_o \cdot \sqrt{1 + (OP' + x/2)^2/l_o^2} \approx l_o + (OP')^2/2l_o + OP' \cdot x/2l_o + x^2/8l_o, \text{ where}$$

$$OE - OO' = x, \text{ hence } OE/2 - OO'/2 = OP'' - OP' = P'P'' = x/2.$$

$$\text{Analogically, } OM_2 = \sqrt{l_o^2 + (OP')^2} \approx l_o + (OP')^2/2l_o.$$

Hence  $OM_2' = OM_2 + OP' \cdot x/2l_o + x^2/8l_o$ , so in taking the total  $\perp$  path ( $OM_2'E$ ) and dividing by  $c$ , one has:  $t_{\perp}'(\text{path } OM_2'E) = t_{\perp} + OP' \cdot x/l_o c + x^2/4l_o c$ .

Therefore, using equation (1) and introducing  $V_e$  in 2nd term:

$$t_{\perp}' = 2l_o(1 + \beta^2/2)/c + (OP'/V_e) \cdot (V_e/c) \cdot (x/l_o) + x^2/4l_o c.$$

Hence with relation  $OP'/V_e = t_{\perp}/2$  and, again, using equation (1), we have:

$$t_{\perp}' = 2l_o(1 + \beta^2/2)/c + \beta \cdot x \cdot (1 + \beta^2/2)/c + x^2/4l_o c.$$

#### 7.3.3.2. The $\parallel$ path $OM_1'E$ .

$$OM_1'(t'_{II\rightarrow}) = ct'_{II\rightarrow} = OM_1 + MM_1' = l_o + V_e \cdot t'_{II\rightarrow},$$

$$\text{hence analogically: } t'_{II\rightarrow} = l_o/c - V_e \approx l_o(1 + \beta + \beta^2)$$

and equally:  $M_1'E(t'_{II\leftarrow}) = ct'_{II\leftarrow} = M_1'O - OO' - x = l_o + V_e \cdot t'_{II\rightarrow} - 2l_o\beta - x$   
/using equation (1), we have:  $OO' \approx 2l_o\beta$ /. With the above equation for  $t'_{II\rightarrow}$ , we get:  $M_1'E = l_o \cdot (1 - \beta + \beta^2) - x$  and  $(t'_{II\leftarrow}) = l_o \cdot (1 - \beta + \beta^2)/c - x/c$ .

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The  $t'_{II}(\text{total})$  decreases with  $x$  and the  $t'_{\perp}$  increases with  $x$ . Let us find the  $x$  at  $\Delta(t'_{II} - t'_{\perp}) = 0$  ( $\Delta$ - difference). One has the second order equation relatively  $x$ :

$$2l_o(1 + \beta^2)/c - x/c - 2l_o(1 + \beta^2/2)/c - \beta x(1 + \beta^2/2)/c - x^2/4l_o c = 0 \quad (2)$$

As consequence:  $x^2 + 4l_o x + 4l_o \beta x - 4l_o \beta^2 = 0$  and one obtains  $x \approx l_o \beta^2$  (3)  
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$$\text{Hence } OM_2' = OM_2 + OP' \cdot x / 2l_o + x^2 / 8l_o, \text{ so in taking the total } \perp \text{ path } (OM_2'E) \text{ and dividing by } c, \text{ one has: } t_{\perp}' (\text{path } OM_2'E) = t_{\perp} + OP' \cdot x / l_o c + x^2 / 4l_o c.$$

Therefore, using equation (1) and introducing  $V_e$  in 2nd term:

$$t_{\perp}' = 2l_o(1 + \beta^2/2)/c + (OP'/V_e) \cdot (V_e/c) \cdot (x/l_o) + x^2/4l_o c.$$

Hence with relation  $OP'/V_e = t_{\perp}/2$  and, again, using equation (1), we have:

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Therefore, using equation (1) and introducing  $V_e$  in 2nd term:

$$t_{\perp}' = 2l_0(1 + \beta^2/2)/c + (OP'/V_e) \cdot (V_e/c) \cdot (x/l_0) + x^2/4l_0 c.$$

Hence with relation  $OP'/V_e = t_{\perp}/2$  and, again, using equation (1), we have:

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As consequence:  $x^2 + 4l_0\beta x + 4l_0\beta x - 4l_0\beta^2 = 0$  and one obtains  $x \approx l_0\beta^2$  (3)  
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### 7.3.3. Time path difference at ANY observation point after 90° rotation (Fig.1B configuration).

#### 7.3.3.1. $\parallel$ path $OM_2'NE$ .

From similar triangles  $\Delta PM_2'N$  and  $\Delta NEE'$ :  $EE'/NE = M_2'P/PN$   
and  $(V_e t'_{\parallel \uparrow} + V_e t'_{\parallel \downarrow})/(y - 2PN) = (l_0 - V_e t'_{\parallel \uparrow})/PN,$

where the  $t_{II\uparrow}$  and  $t_{II\downarrow}$  - the times for path  $OM_2'$  and  $M_2'$ 'NE' correspondingly. After the simple transformations, we get:  $PN = y(l_0 - V_e t_{II\uparrow}) / (2l_0 + V_e t_{II\downarrow} - V_e t_{II\uparrow})$ .

After the approximation (series Taylor) of the above corrected inverse function with the consecutive multiplication (in neglecting /at the end/ the terms of higher /than  $\beta^2$ / orders), one get:  $PN \approx y/2$  (4), where the  $y$  must be already proportional to  $l_0 \beta^2$  (§7.3.2.3.). Let find NE' from the similar triangles  $\Delta OM_2'N$  and  $\Delta NEE'$ :

$$NE' = NM_2' \cdot EE'/M_2'P = OM_2' \cdot (V_e t_{II\uparrow} + V_e t_{II\downarrow}) / (l_0 - V_e t_{II\uparrow}) \quad (\text{where } NM_2' = OM_2').$$

Analogically to the transformations of PN /in obtaining the equation (4)/, we get:

$$NE' = (OM_2'/l_0) \cdot (V_e t_{II\uparrow} + V_e t_{II\downarrow} + V_e^2 t_{II\uparrow}^2/l_0 + V_e^2 t_{II\uparrow} t_{II\downarrow}/l_0) \quad (5).$$

From right-angled triangle  $\Delta OM_2'P$ , one has:

$$OM_2' = \sqrt{(OP)^2 + (M_2'P)^2} = \sqrt{(PN)^2 + (l_0 - V_e t_{II\uparrow})^2}.$$

With simple calculations (analogically to §7.3.2.1.) in dividing by  $l_0$ , approximating the root (Taylor series: taking firstly until the term of second order) and in neglecting (at the end) the terms of higher (than  $\beta^2$ ) orders, we obtain (after deviding by  $c$ ):

$$t_{II\uparrow}(OM_2') = (l_0/c) \cdot (1 - V_e t_{II\uparrow}/l_0 + (PN)^2/2l_0^2).$$

Using equation (4), one has:  $t_{II\uparrow} = l_0/c - V_e t_{II\uparrow}/c + y^2/8l_0 c$  (6),

hence one can find  $t_{II\uparrow}$ :  $t_{II\uparrow} = (8l_0 + y^2)/(8l_0 c + 8l_0 V_e)$ ,

and then after approximation (series Taylor) of the above corrected (division and multiplication by  $8l_0 c$ ) inverse function with consecutive multiplication (neglecting the higher terms) (analogically to the, justly, above), we get:

$$t_{II\uparrow} = l_0/c - l_0 \beta/c + l_0 \beta^2/c + y^2/8l_0 c \quad (7)$$

From equation (5), one has the time for NE' light path:

$$t_{NE'\downarrow} = (t_{II\uparrow}/l_0) (V_e t_{II\uparrow} + V_e t_{II\downarrow} + V_e^2 t_{II\uparrow}^2/l_0 + V_e^2 t_{II\uparrow} t_{II\downarrow}/l_0).$$

This equation permits to calculate the time for  $M_2'$ 'NE' path:  $t_{II\downarrow}(M_2'NE') = t_{II\uparrow} + t_{NE'\downarrow}$ , where analogically to obtaining the equation (7) from (6), one gets the expression for  $t_{II\downarrow}$  with approximation of inverse function, multiplications and simple transformations:

$$t_{II\downarrow} = t_{II\uparrow} + 2t_{II\uparrow}^2 V_e/l_0 + 3t_{II\uparrow}^3 V_e^2/l_0^2.$$

So  $t_{II}(\text{total}) = t_{II\uparrow} + t_{II\downarrow} = 2t_{II\uparrow} + 2t_{II\uparrow}^2 V_e/l_0 + 3t_{II\uparrow}^3 V_e^2/l_0^2$  and using the equation (7), taking even one term from  $t_{II\uparrow}^3$ , making the simple transformations and neglecting the terms of higher orders, we get:  $t_{II}(\text{total}) \approx 2l_0/c + y^2/4l_0 c$  (8).

### 7.3.3.2. $\perp$ path $OM_1'E'$ .

With help of the right-angled triangles  $\Delta OM_1'R$  and  $\Delta HM_1'E'$ , one has:

$$OM_1'^2 = c^2 t_{\perp\rightarrow}^2 (OM_1') = (RM_1')^2 + OR^2 = l_0^2 + V_e^2 t_{II\uparrow}^2, \text{ hence, analogically to §7.3.1., simply, } t_{\perp} \approx (l_0/c) (1 + \beta^2/2) \text{ using the equation (7).}$$

$$\text{Also: } (M_1'E')^2 = c^2 t_{\perp\leftarrow}^2 (M_1'E') = (M_1'H)^2 + (HE')^2 = (l_0 - y)^2 + (V_e t_{II\downarrow})^2.$$

$$t_{II\downarrow} = t_{II}(\text{total}) - t_{II\uparrow} = l_0/c + y^2/8l_0 c + l_0 \beta/c - l_0 \beta^2/c \text{ with equations (8) and (7).}$$

$$\text{And } t_{\perp\leftarrow} = (1/c) \sqrt{(l_0 - y)^2 + V_e^2 (l_0/c + y^2/8l_0 c + l_0 \beta/c - l_0 \beta^2/c)^2} \approx (9).$$

$$(l_0/c) (1 + \beta^2/2 - y/l_0) \text{ neglecting the terms of the order, higher than 2 (in taking}$$

the 3 terms at the root approximation). Consequently,

$$t_{\perp}(\text{total}) = t_{\perp\rightarrow} + t_{\perp\leftarrow} = 2l_0(1 + \beta^2/2)/c - y/c. \quad (9).$$

§7.3.3.3. So  $t_{II}(\text{total})$  increases with  $y$  and  $t_{\perp}$  decreases with  $y$ .

where the  $t_{II\uparrow}$  and  $t_{II\downarrow}$  - the times for path  $OM_2'$  and  $M_2'$ 'NE' correspondingly. After the simple transformations, we get:  $PN = y(l_0 - V_e t_{II\uparrow}) / (2l_0 + V_e t_{II\downarrow} - V_e t_{II\uparrow})$ .

After the approximation (series Taylor) of the above corrected inverse function with the consecutive multiplication (in neglecting /at the end/ the terms of higher /than  $\beta^2$ / orders), one get:  $PN \approx y/2$  (4), where the  $y$  must be already proportional to  $l_0 \beta^2$  (§7.3.2.3.). Let find NE' from the similar triangles  $\Delta OM_2'N$  and  $\Delta NEE'$ :

$$NE' = NM_2' \cdot EE' / M_2'P = OM_2' \cdot (V_e t_{II\uparrow} + V_e t_{II\downarrow}) / (l_0 - V_e t_{II\uparrow}) \quad (\text{where } NM_2' = OM_2').$$

Analogically to the transformations of PN /in obtaining the equation (4)/, we get:

$$NE' = (OM_2' / l_0) \cdot (V_e t_{II\uparrow} + V_e t_{II\downarrow} + V_e^2 t_{II\uparrow}^2 / l_0 + V_e^2 t_{II\uparrow} t_{II\downarrow} / l_0) \quad (5).$$

From right-angled triangle  $\Delta OM_2'P$ , one has:

$$OM_2'^2 = (OP)^2 + (M_2'P)^2 = (PN)^2 + (l_0 - V_e t_{II\uparrow})^2.$$

With simple calculations (analogically to §7.3.2.1.) in dividing by  $l_0$ , approximating the root (Taylor series: taking firstly until the term of second order) and in neglecting (at the end) the terms of higher (than  $\beta^2$ ) orders, we obtain (after deviding by  $c$ ):

$$t_{II\uparrow}(OM_2') = (l_0/c) \cdot (1 - V_e t_{II\uparrow} / l_0 + (PN)^2 / 2l_0^2).$$

Using equation (4), one has:  $t_{II\uparrow} = l_0/c - V_e t_{II\uparrow} / c + y^2 / 8l_0 c$  (6),

hence one can find  $t_{II\uparrow}$ :  $t_{II\uparrow} = (8l_0 + y^2) / (8l_0 c + 8l_0 V_e)$ ,

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From equation (5), one has the time for NE' light path:

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This equation permits to calculate the time for  $M_2'$ 'NE' path:

$$t_{II\downarrow}(M_2'NE') = t_{II\uparrow} + t_{NE'\downarrow},$$

where analogically to obtaining the equation (7) from (6), one gets the expression for  $t_{II\downarrow}$  with approximation of inverse function, multiplications and simple transformations:

$$t_{II\downarrow} = t_{II\uparrow} + 2t_{II\uparrow}^2 V_e / l_0 + 3t_{II\uparrow}^3 V_e^2 / l_0^2.$$

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$$\text{Also: } (M_1'E')^2 = c^2 t_{\perp\leftarrow}^2 (M_1'E') = (M_1'H)^2 + (HE')^2 = (l_0 - y)^2 + (V_e t_{II\downarrow})^2.$$

$$t_{II\downarrow} = t_{II}(\text{total}) - t_{II\uparrow} = l_0/c + y^2/8l_0 c + l_0 \beta / c - l_0 \beta^2 / c \text{ with equations (8) and (7).}$$

$$\text{And } t_{\perp\leftarrow} = (1/c) \sqrt{(l_0 - y)^2 + V_e^2 (l_0/c + y^2/8l_0 c + l_0 \beta / c - l_0 \beta^2 / c)^2} \approx \quad (9).$$

$$(l_0/c) (1 + \beta^2/2 - y/l_0) \text{ neglecting the terms of the order, higher than 2 (in taking}$$

the 3 terms at the root approximation). Consequently,

$$t_{\perp}(\text{total}) = t_{\perp\rightarrow} + t_{\perp\leftarrow} = 2l_0(1 + \beta^2/2)/c - y/c. \quad (9).$$

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where the  $t_{II\uparrow}$  and  $t_{II\downarrow}$  - the times for path  $OM_2'$  and  $M_2'$ 'NE' correspondingly. After the simple transformations, we get:  $PN = y(l_0 - V_e t_{II\uparrow}) / (2l_0 + V_e t_{II\downarrow} - V_e t_{II\uparrow})$ .

After the approximation (series Taylor) of the above corrected inverse function with the consecutive multiplication (in neglecting /at the end/ the terms of higher /than  $\beta^2$ / orders), one get:  $PN \approx y/2$  (4), where the  $y$  must be already proportional to  $l_0 \beta^2$  - §7.3.2.3.). Let find NE' from the similar triangles  $\Delta OM_2'N$  and  $\Delta NEE'$ :

$$NE' = NM_2' \cdot EE' / M_2'P = OM_2' \cdot (V_e t_{II\uparrow} + V_e t_{II\downarrow}) / (l_0 - V_e t_{II\uparrow}) \quad (\text{where } NM_2' = OM_2').$$

Analogically to the transformations of  $PN$  /in obtaining the equation (4)/, we get:

$$NE' = (OM_2' / l_0) \cdot (V_e t_{II\uparrow} + V_e t_{II\downarrow} + V_e^2 t_{II\uparrow}^2 / l_0 + V_e^2 t_{II\uparrow} t_{II\downarrow} / l_0) \quad (5).$$

From right-angled triangle  $\Delta OM_2'P$ , one has:

$$OM_2'^2 = (OP)^2 + (M_2'P)^2 = (PN)^2 + (l_0 - V_e t_{II\uparrow})^2.$$

With simple calculations (analogically to §7.3.2.1.) in dividing by  $l_0$ , approximating the root (Taylor series: taking firstly until the term of second order) and in neglecting (at the end) the terms of higher (than  $\beta^2$ ) orders, we obtain (after deviding by  $c$ ):

$$t_{II\uparrow} (OM_2') = (l_0 / c) \cdot (1 - V_e t_{II\uparrow} / l_0 + (PN)^2 / 2l_0^2).$$

Using equation (4), one has:  $t_{II\uparrow} = l_0 / c - V_e t_{II\uparrow} / c + y^2 / 8l_0 c$  (6),

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This equation permits to calculate the time for  $M_2'$ 'NE' path:  $t_{II\downarrow} (M_2'NE') = t_{II\uparrow} + t_{NE'\downarrow}$ , where analogically to obtaining the equation (7) from (6), one gets the expression for  $t_{II\downarrow}$  with approximation of inverse function, multiplications and simple transformations:

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$$\text{Also: } (M_1E')^2 = c^2 t_{\perp\leftarrow}^2 (M_1E') = (M_1H)^2 + (HE')^2 = (l_0 - y)^2 + (V_e t_{II\downarrow})^2.$$

$$t_{II\downarrow} = t_{II}(\text{total}) - t_{II\uparrow} = l_0 / c + y^2 / 8l_0 c + l_0 \beta / c - l_0 \beta^2 / c \text{ with equations (8) and (7).}$$

$$\text{And } t_{\perp\leftarrow} = (1/c) \sqrt{(l_0 - y)^2 + V_e^2 (l_0 / c + y^2 / 8l_0 c + l_0 \beta / c - l_0 \beta^2 / c)^2} \approx \quad (9).$$

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$$t_{\perp}(\text{total}) = t_{\perp\rightarrow} + t_{\perp\leftarrow} = 2l_0 (1 + \beta^2 / 2) / c - y / c. \quad (9).$$

§7.3.3.3. So  $t_{II}(\text{total})$  increases with  $y$  and  $t_{\perp}$  decreases with  $y$ .

Let find again the  $y$  value when their difference is zero  $\Delta(t_{\perp} - t_{\parallel}) = 0$ :

Easily with equations (8) and (9), we get the second order equation for  $y$ :

Hence:  $y^2 + 4l_0 y - 4l_0^2 \beta^2 = 0$  (10) and  $y = l_0 \beta^2$ , coinciding perfectly with similar calculations for Fig.1A, confirming well the validity of these long calculations.

#### 7.4. Clearest Utopy of Michelson's interferometer measurements.

Now we are ready to realize the (yet) most grave experimental error in the science history. Let realize the formation of the interference pattern in such interferometer. It is not formed by the difference of the light paths due to the differences in the Earth velocities but by the virtual images  $M_{1i}$  and  $M_{2i}$  in the  $M_2$  mirror where these "virtual images... will be placed side by side and we obtain a system of parallel fringes" /10/ and the light path differences of the  $\perp$  and  $\parallel$  directions (to Earth movement) makes only the modulation, redistribution of such pattern (Fig.2).

Let see the shift of any particular virtual maximum at the increasing of the optic path in the telescope arm (" $M_2$ "), corresponding to the  $\perp$  path at the configuration of Fig.1A. It can be done with the increasing of the optical density, in putting some plexiglass at pathway " $M_2$ " (as at phase fluorometer calibration) or due to the delaying influence of the Earth movement in observing the interference closer to point O. In such case, the path difference between the virtual sources ( $M_{2i}A$ ) will increase. And the difference ( $M_{2i}A$ ), that should be constant to correspond to the maximum must correspond to the pattern, situated already more on the left: at  $x_2$ . But at the new, more left,  $x_2$  observation point, the difference between the  $\perp$  and  $\parallel$  pathways increases automatically according to the equation (2), it means the real maximum will be righter, at some point  $x_3$ . So the interferometer is clearly desensitized, because at the shifting of the interference pattern there is the automatic appearance of the additional COMPENSATING (partly neutralizing), always opposite shift due to the dependence of the shift value  $\Delta(\perp - \parallel)$  on the observation point according to equation (2). The situation is similar at the geometric configuration, corresponding to Fig.1B. So Michelson apriori could not have the corresponding shift with his measurements and Einstein took the very clear false basis for his postulate N°1. Consequently, it is clear definitive irreversible end of the Odyssey with very imaginative Theory of Relativity of Albert Einstein, previous N°1 in the World Science.

#### 7.5. Spectacular experimental, 70 years old, confirmation (already) of author's conclusions.

But such "automatic" difference between the  $\perp$  and  $\parallel$  paths along the observation line  $OM_1$  (Fig.1) must lead to the fringes with the different width. Evidently, at the lowest  $x$  values, the  $x_3$  is more left from  $x_1$ , than at higher  $x$  (Fig.2A).

Evidently, the regular interference (from virtual sources) observable pattern changes (shift to the left) stronger at the lowest  $x$ , with the shift decrease at  $x$  increase. (Figs.1A and 2A) that clearly must lead to the decrease of the fringe width with the  $x$  increase until  $x = l_0 \beta^2$ . Moreover, my calculations (§7.2.-7.4.) prove also that, at  $x = l_0 \beta^2$ , the picture will be relatively more symmetrical than elsewhere because the path

Let find again the  $y$  value when their difference is zero  $\Delta(t_{\perp} - t_{\parallel}) = 0$ :

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Note, that:  $V_e \cdot t_{\parallel} \approx V_e \cdot t_{\perp} \approx V_e \cdot l_0/c \approx l_0 \cdot \beta$ .

Fig.2.A. Evident desensitization of the Michelson-Miller Interferometer. Due to the automatic difference between the  $\perp$  and  $\parallel$  light paths, the registered shift of the interference pattern is much less than it were to be.  $M_{1i}$  and  $M_{2i}$ - virtual coherent images of the light source in  $M_2$  mirror ( $M_{1i}$ - is the image due to path at the  $M_1$  mirror directions that is /as secondary/ visible in the  $M_2$  mirror with help of the focused appropriately telescope T). Maximum (Max) N°1 is any particular interference maximum that would be visible if there is no special obstacles. Max N°2 would be the new position (because of the shift) of Max N°1 due to the increase of the optical path of the "M<sub>2</sub> path" /as the pathway with the plexiglass (with increased optical density) on the pathway as at the phase fluorometer calibration or the delaying influence of the Earth movement/. Max N°3 is the real position (very decreased shift) of Max N°1 because of the above influence: real Michelson interferometer measurements due to the superposition of the permanent difference between the both pathways (on interference pattern of the  $M_{1i}$  and  $M_{2i}$  virtual coherent sources), which, itself, depends on the NEW position of the maximum shift (VARIATION with x and y- Fig.1A,B). Situation (here), corresponding to the configuration of Fig.1A. B. Evident Hypersensitization of the Michelson-Miller Interferometer. This time the virtual image  $M_{2i}$  is adjusted (more difficultly) to be farer from the  $M_2$  mirror! One sees equally (to Fig.2A) that the shift in  $X_2$  (of the original  $X_1$  maximum) increases (this time) automatically the measured  $X_3$  distance. Configuration, here, of Fig.1B.

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Important Supplement for Research- According to Law.

According to Law /for instance, Art.52(3) of Convention of European Patent Office (EPO)/: "The provisions of paragraph 2 (as nonpatentability of discoveries and scientific theories AS SUCH) shall exclude patentability of the subject-matter or activities referred to in that provision only (ONLY) to the extent to which a European patent application... relates to such ... subject-matter or activities AS SUCH (it means without their practical applications)". To see also the Accord between a number of Offices making the International Search (as EPO, of USA, of Russia, of Austria, of Sweden, of Japan) and World International Patent Organisation in "PCT Gazette" 56/1997 (Appendix B): "are not excluded from research (PCT) or examination (PCT): all objects that are submitted to the research or examination according to the national procedure". Very clearly, as well in "Guidelines for Examination in European Patent Office" §CIV-2.2. .

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